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FAX

Urgent and Confidential

Date: March 9, 2006

TO:	**USPTO**	
	Examiner	W. Briney III
	Art Unit	2646
	Fax Number	571-273-8300
FROM:	**Alan Pedersen-Giles**	
	Fax Number	703-633-3303
	Phone Number	703-633-1061
SUBJECT:	Application Number	09/996,255
	Inventor(s)	John H. LIEDER, et al.
	Date Filed	November 28, 2001
	Docket Number	42.P10109
	Title	UNIVERSAL TELEPHONY INTERFACE POLARITY DETECTOR

INCLUDED IN THIS TRANSMISSION:

Fax Cover Sheet	1 page
Transmittal	1 page
Reply Brief	6 pages

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Cathy Dikes Cathy Dikes

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TRANSMITTAL FORM

(to be used for all correspondence after initial filing)

Total Number of Pages in This Submission: 8

Application Number	09/996,255
Filing Date	November 28, 2001
First Named Inventor	John H. LIEDER
Art Unit	2644
Examiner Name	W. Briney III
Attorney Docket Number	42.P10109

ENCLOSURES *(Check all that apply)*

- ☐ Fee Transmittal Form
  - ☐ Fee Attached
- ☐ Amendment/Reply
  - ☐ After Final
  - ☐ Affidavits/declaration(s)
- ☐ Extension of Time Request
- ☐ Express Abandonment Request
- ☐ Information Disclosure Statement
- ☐ Certified Copy of Priority Document(s)
- ☐ Reply to Missing Parts/ Incomplete Application
  - ☐ Reply to Missing Parts under 37 CFR 1.52 or 1.53
- ☐ Drawing(s)
- ☐ Licensing-related Papers
- ☐ Petition
- ☐ Petition to Convert to a Provisional Application
- ☐ Power of Attorney, Revocation Change of Correspondence Address
- ☐ Terminal Disclaimer
- ☐ Request for Refund
- ☐ CD, Number of CD(s) _____
  - ☐ Landscape Table on CD
- ☐ After Allowance Communication to TC
- ☐ Appeal Communication to Board of Appeals and Interferences
- ☑ Appeal Communication to TC **(Appeal Notice, Brief, Reply Brief)**
- ☐ Proprietary Information
- ☐ Status Letter
- ☑ Other Enclosure(s) (please Identify below):
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Remarks

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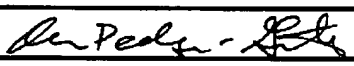
Signature			
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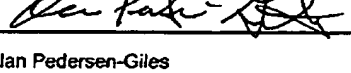
Signature			
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PATENT
Attorney Docket No. 42.P10109

BEFORE THE BOARD OF PATENT APPEALS AND INTERFERENCES

In re Patent Application of	
John H. LIEDER et al.	Group Art Unit: 2646
Application No.: 09/996,255	Examiner: W. Briney III
Filed: November 28, 2001	
For: UNIVERSAL TELEPHONY INTERFACE POLARITY DETECTOR	

REPLY BRIEF

Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

Sir:

Appellants submit herewith a Reply Brief as required by 37 C.F.R. § 41.41 in response to the Examiner's Answer mailed January 9, 2006.

For ease of reference, the Argument section below is organized similarly to the Argument section in the earlier-filed Appeal Brief.

CERTIFICATE OF TRANSMISSION

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By: Cathy Dikes
Cathy Dikes

Date: March 9, 2006

I. ARGUMENT:

Appellants first note that pages 9-11 of the Examiner's Answer purport to be a "synopsis of Hwang et al." Though there is some discussion of what Hwang et al. discloses, pages 9-11 of the Answer also include incorrect technical statements (e.g., page 10, lines 3 and 4: "such that the output of the circuit comprises slow moving voltages only." See Appeal Brief, page 4, second full paragraph, for evidence of very fast-changing output voltages), technical and legal conclusions (e.g., page 10, lines 4 and 5: "this structure corresponds to a low-pass filter"; and page 11, last two lines: "the lack of teaching by Hwang would inherently motivate one of ordinary skill in the art . . ."), and argument (e.g., page 10, lines 13-15). Hence, Appellants respectfully request that the Board, when reading pages 9-11 of the Examiner's Answer, separate that which is actually synopsis from that which is not.

A. Claims 1-6, 13, 17, 18, 20, 21, and 27-29 are patentable under 35 U.S.C. § 103(a) over Hwang et al. in view of Albouy.

1. Claims 1-6, 20, 21, and 27-29:

a. Hwang et al. in view of Albouy when combined fail to teach or suggest all claim limitations:

Appellants respectfully disagree with the Examiner's assertion on page 10, lines 13-15, of the Answer that "the plain claim language" does not recite "how the low-pass filter is to operate." All low pass filters, including the one claimed, pass low frequencies in their passband and do not pass high frequencies in their stopband (see again, Exhibit A, Fig. 7.4-1(a)). As explained in the Appeal Brief, page 4, second full paragraph, components 59, 591, and 592 of Hwang et al. pass the extremely high frequencies contained in vertical voltage transitions. Because these components of Hwang et al. pass both low frequencies and high frequencies, they

do not behave as "low pass filters" are universally acknowledged to operate. Thus, it is unreasonable to read the claimed "low pass filter" on these components of Hwang et al.

In the face of this explanation, it is incredible for the Examiner to refer to the vertical transitions with near-infinite slope at 215, 225, 235, 245, and 255 of node C in Exhibit C as "some non-linear properties" on page 13, line 4 of the Answer. These transitions include very high frequencies, as is apparent from Figs. 2(d) and 2(f) of Exhibit B. Components 59, 591, and 592 of Hwang et al. plainly do not block or stop such high frequencies. Thus, contrary to page 13, lines 6 and 7 of the Answer, the language of claims 1-6, 20, 21, and 27-29, "low pass filter," does stipulate that such an effect (i.e., passing high frequencies) is outside the scope of the claims.

For at least these reasons, the combination of Hwang et al. and Albouy fails to teach or suggest the low pass filter set forth in claims 1, 4, and 20.

b. There is no motivation or suggestion to combine the teachings of Hwang et al. and Albouy:

By adding Albouy, the Examiner seeks to transform Schmidt trigger 58 in Hwang et al., which is not claimed, to a differential amplifier, which is claimed. On pages 13 and 14 of the Examiner's Answer, rather than provide any evidence why one of ordinary skill in the art would have done so, the Examiner appears to rely on the fact that the differential amplifier design in Albouy was "available" at the time of the invention (Answer, page 11, last four lines, and page 14, lines 6-10). As noted in the M.P.E.P., however, it is not enough for something merely to be well known or old. See M.P.E.P. § 2143.01(IV): "Fact That The Claimed Invention Is Within The Capabilities Of One Of Ordinary Skill In The Art Is Not Sufficient By Itself To Establish

Prima Facie Obviousness." The Examiner declines Appellants' request for any evidence of a suggestion or motivation to combine the references (Answer, page 14, lines 6 and 7).

The Examiner implies on page 11 and page 14 of the Answer that because Albouy is in a similar technical area to Hwang et al., this would somehow make it more likely that one of ordinary skill would have chosen Albouy's differential amplifier design for the Schmidt Trigger of Hwang et al. than any other implementation. Just because something can be found in the telecom arts does not mean, however, that one of ordinary skill would have been motivated to add it to anything or everything else in the telecom arts. See M.P.E.P. § 2143.01(III): "Fact That References Can Be Combined Or Modified Is Not Sufficient To Establish Prima Facie Obviousness."

Because the Examiner has provided no evidence why one of ordinary skill in the art would have chosen the Schmitt trigger design in Albouy over any of the other myriad of possible Schmitt trigger designs, a *prima facie* case of obviousness still has not been established for claims 1, 4, and 20.

Because a *prima facie* case of obviousness has not been established for claims 1, 4, and 20, the § 103(a) rejections of claims 1, 4, and 20 are improper and should be reversed.

Claims 2, 3, 5, 6, 21, and 27-29 are allowable at least by virtue of their dependency from claims 1, 4, and 20.

2. Claims 13, 17, and 18:

a. Hwang et al. in view of Albouy when combined fail to teach or suggest all claim limitations:

Independent claim13 requires a method including, *inter alia*, "filtering out a polarity reversal that lasts shorter than a defined time." The Examiner on page 11, lines 1-3, of the

Answer admits that "a line reversal substantially comprising a single pulse with a long silent interval will be passed by the resistor-capacitor filter of Hwang." Hence, that Hwang et al. fails to filter out a short polarity reversal (i.e., the "Line-reversal" impulse on the T/R trace in Fig. 2 of Hwang et al.) is undisputed.

Then the Examiner makes much on pages 11 and 14 of the pulses associated with the long Ring pulse being filtered. The long "Ring" pulse on the T/R trace in Fig. 2 of Hwang et al. does not reasonably correspond to the claimed "polarity reversal that lasts shorter than a defined time," so whether it is filtered out or not is irrelevant. Nor can the long "Ring" pulse reasonably be considered "filtered out," because its response at Node C behaves just like the response at Node C to the "Line-reversal" impulse on the T/R trace. That is, the rising edge of the Ring pulse on the T/R trace produces a sharp falling edge at Node C, and the falling edge of the Ring pulse produces a gradual rising transition at Node C in Fig. 2 of Hwang et al. Thus, the Ring pulse on the T/R trace also has not been "filter[ed] out" by Hwang et al.

Because the combination of Hwang et al. and Albouy fails to teach or suggest all elements of claims 1, 4, 13, and 20, a *prima facie* case of obviousness has not been established for these claims.

b. There is no motivation or suggestion to combine the teachings of Hwang et al. and Albouy:

Appellants have explained above that no suggestion or motivation to combine Hwang et al. and Albouy has been shown. Such explanation is equally applicable to claims 13, 17, and 18, and a *prima facie* case of obviousness has not been established for this additional reason.

B. Claim 12 is patentable under 35 U.S.C. § 103(a) over Hwang et al. in view of Albouy, and further in view of Bijman et al.

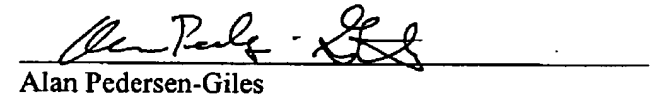
Regarding the rejection of claim 12, the addition of Bijman et al. fails to cure the deficiencies in Hwang et al. and Albouy noted above with respect to claim 4. Bijman et al. also fails to teach or suggest the low pass filter element of claim 4. Its addition cannot establish a *prima facie* case of obviousness for this claim, because the combination of references still fails to teach or suggest the required low pass filter. The rejection of claim 12 should be reversed for at least this reason.

For the reasons set forth above, Appellants respectfully solicit the Honorable Board to reverse the Examiner's rejection of claims 1-6, 12, 13, 17, 18, 20, 21, and 27-29.

To the extent necessary, a petition for an extension of time under 37 C.F.R. § 1.136 is hereby made. Please charge any shortage in fees due in connection with the filing of this paper, including extension of time fees, to Deposit Account No. 50-0221 and please credit any excess fees to such deposit account.

Respectfully submitted,

Dated: March 9, 2006



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